# **Bay Area Air Quality Management District**

939 Ellis Street San Francisco, CA 94109 (415) 771-6000

# **Final**

# MAJOR FACILITY REVIEW PERMIT

# **Issued To:**

City of Santa Rosa (Laguna Subregional) Wastewater Treatment Plant Facility #1403

**Facility Address:** 

4300 Llano Road Santa Rosa

**Mailing Address:** 

4300 Llano Road Santa Rosa

**Responsible Official** 

Miles Ferris, Dir. Of Utilities (707) 543-3350

**Facility Contact** 

Scott Stinebaugh, Manager (707) 543-3350

**Type of Facility:** Publicly Owned Treatment Works

Primary SIC: 4952

**Product:** Municipal Wastewater Treatment Facility

### ISSUED BY THE BAY AREA AIR QUALITY MANAGEMENT DISTRICT

Ellen Garvey, Air Pollution Control Officer	Date

Facility Name: City of Santa Rosa Wastewater Treatment Plant

Final Permit for Facility #: 1403

Expiration Date: 7-1-02

ID:AC

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Facility Name: City of Santa Rosa Wastewater Treatment Plant

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### STANDARD CONDITIONS

### A. Administrative Requirements

The permit holder shall comply with all applicable requirements in the following regulations:

BAAQMD Regulation 1 – General Provisions and Definitions

(as amended by the District Board on 11/3/93);

SIP Regulation 1 – General Provisions and Definitions

(as approved by EPA through 11/10/82);

BAAQMD Regulation 2, Rule 1 – Permits, General Requirements

(as amended by the District Board on 6/7/95);

SIP Regulation 2, Rule 1 – Permits, General Requirements

(as approved by EPA through 6/23/95);

BAAQMD Regulation 2, Rule 2 – Permits, New Source Review

(as amended by the District Board on 6/7/95);

SIP Regulation 2, Rule 2 – Permits, New Source Review and Prevention of Significant Deterioration

(as approved by EPA through 10/19/84); and

BAAQMD Regulation 2, Rule 4 – Permits, Emissions Banking

(as amended by the District Board on 6/15/94).

### B. Conditions to Implement Regulation 2, Rule 6, Major Facility Review

- 1. This Major Facility Review Permit expires on July 1, 2002. The permit holder shall submit a complete application for renewal of this Major Facility Review Permit no later than January 1, 2002 and no earlier than July 1, 2001. **If a complete application for renewal has not been submitted in accordance with these deadlines, the facility may not operate after June 30, 2002.** (Regulation 2-6-307, 404.2, & 409.6; MOP Volume II, Part 3, §4.2)
- 2. The permit holder shall comply with all conditions of this permit. The permit consists of this document and all appendices. Any non-compliance with the terms and conditions of this permit will constitute a violation of the law and will be grounds for enforcement action; permit termination, revocation and reissuance, or modification; or denial of a permit renewal application. (Regulation 2-6-307; MOP Volume II, Part 3, §4.11)
- 3. In the event any enforcement action is brought as a result of a violation of any term or condition of this permit, the fact that it would have been necessary for the permittee to halt or reduce the permitted activity in order to maintain compliance with such term or condition shall not be a defense to such enforcement action. (MOP Volume II, Part 3, §4.11)
- 4. This permit may be modified, revoked, reopened and reissued, or terminated for cause. (Regulation 2-6-307, 409.8, 415; MOP Volume II, Part 3, §4.11)
- 5. The filing of a request by the facility for a permit modification, revocation and

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# I. Standard Conditions (continued)

reissuance, or termination, or of a notification of planned changes or anticipated non-compliance does not stay the applicability of any permit condition. (Regulation 2-6-409.7; MOP Volume II, Part 3, §4.11)

- 6. This permit does not convey any property rights of any sort, nor any exclusive privilege. (Regulation 2-6-409.7; MOP Volume II, Part 3, §4.11)
- 7. The permit holder shall supply within 30 days any information that the District requests in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating the permit or to determine compliance with the permit. (Regulation 1-441, Regulation 2-6-409.4 & 501; MOP Volume II, Part 3, §4.11)
- 8. Any records required to be maintained pursuant to this permit which the permittee considers to contain proprietary or trade secret information shall be prominently designated as such. Copies of any such proprietary or trade secret information which are provided to the District shall be maintained by the District in a locked confidential file, provided, however, that requests from the public for the review of any such information shall be handled in accordance with the District's procedures set forth in Section 11 of the District Administrative Code. (Regulation 2-6-419; MOP Volume II, Part 3, §4.11)
- 9. Proprietary or trade secret information provided to EPA will be subject to the requirements of 40 CFR Part 2, Subpart B Public Information, Confidentiality of Business Information. (40 CFR Part 2)
- 10. The emissions inventory submitted with the application for this Major Facility Review Permit is an estimate of actual emissions for the time period stated and is included only as one means of determining applicable requirements for emission sources. It does not establish, or constitute a basis for establishing, any new emission limitations. (MOP Volume II, Part 3, §4.11)

### C. Requirement to Pay Fees

The permit holder shall pay annual fees in accordance with District Regulation 3, including Schedule P. (Regulation 2-6-402 & 409.13, Regulation 3; MOP Volume II, Part 3, §4.12)

### **D.** Inspection and Entry

Access to Facility: The permit holder shall provide reasonable access to the facility and equipment which is subject to this permit to the APCO and/or to his or her designee. (Regulation 1-440, Regulation 2-6-409.3; MOP Volume II, Part 3, §4.14)

### E. Records

Notwithstanding the specific wording in any requirement, all records for federally enforceable requirements shall be maintained for at least five years from the date of entry. (Regulation 2-6-501, Regulation 3; MOP Volume II, Part 3, §4.7)

### F. Monitoring Reports

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# I. Standard Conditions (continued)

All required monitoring reports must be submitted to the District at least once every six months. All instances of non-compliance shall be clearly identified in these reports. The reports shall be certified by the responsible official as true, accurate, and complete. In addition, all instances of non-complicance with the permit shall be reported to the District's Compliance and Enforcement Division within 10 days of the discovery of the incident. Within 30 days of the discovery of any incident of non-compliance, the facility shall submit a written report including the probable cause of non-compliance and any corrective or preventative actions. (Regulation 2-6-502, Regulation 3; MOP Volume II, Part 3, §4.7)

### **G.** Compliance Certification

Compliance certifications shall be submitted annually by the responsible official of this facility to the Bay Area Air Quality Management District and to the Environmental Protection Agency. The certification must list each applicable requirement, the compliance status, whether compliance was continuous or intermittent, the method used to determine compliance, and any other specific information required by the permit. The permit holder may satisfy this requirement through submittal of District-generated Compliance Certification forms. The certification should be directed to the District's Compliance and Enforcement Division, and a copy of the certification should be sent to the Environmental Protection Agency at the following address:

Director of the Air Division USEPA, Region IX 75 Hawthorne Street San Francisco, CA 94105 Attention: Air-3

(MOP Volume II, Part 3, §4.5 and 4.15)

# **H.** Emergency Provisions

- The permit holder may seek relief from enforcement action in the event of a breakdown, as defined by Regulation 1-208 of the District's Rules and Regulations, by following the procedures contained in Regulations 1-431 and 1-432. The District will thereafter determine whether breakdown relief will be granted in accordance with Regulation 1-433. (MOP Volume II, Part 3, §4.8)
- 2 The permit holder may seek relief from enforcement action for a violation of any of the terms and conditions of this permit caused by conditions beyond the permit holder's reasonable control by applying to the District's Hearing Board for a variance pursuant to Health and Safety Code Section 42350. The Hearing Board will determine after notice and hearing whether variance relief should be granted in accordance with the procedures and standards set forth in Health and Safety Code Section 42350 et seq. Any variance granted by the Hearing Board from any term or condition of this permit which lasts longer than 90 days will be subject to EPA approval. (MOP Volume II, Part 3, §4.8)

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# I. Standard Conditions (continued)

3. Notwithstanding the foregoing, the granting by the District of breakdown relief or the issuance by the Hearing Board of a variance will not provide relief from federal enforcement unless the Major Facility Review Permit has been modified pursuant to Regulation 2, Rule 6. (MOP Volume II, Part 3, §4.8)

### I. Severability

In the event that any provision of this permit is invalidated by a court or tribunal of competent jurisdiction, or by the Administrator of the EPA, all remaining portions of the permit shall remain in full force and effect. (Regulation 2-6-409.5; MOP Volume II, Part 3, §4.10)

### J. Accidental Release

This facility is subject to 40 CFR Part 68, Chemical Accident Prevention Provisions. The permit holder shall submit a risk management plan (RMP) by the date specified in §68.10. The permit holder shall also certify compliance with the requirements of Part 68 as part of the annual compliance certification, as required by Regulation 2, Rule 6. (40 CFR Part 68, Regulation 2, Rule 6)

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# II. EQUIPMENT LIST

# **B.** Permitted Source List

Each of the following sources has been issued a permit to operate pursuant to the requirements of BAAQMD Regulation 2-1-302.

Table II-A

S-#	Description	Make or Type	Model	Capacity
S-3	Compost Bay			36,500 tons
S-4	Stockpiles			36,500 tons
S-5	Screens			36,500 tons
S-17	Irrigation Ponds			60 MM gal/day
S-18	Irrigation Ponds			37 MM gal/day
S-28	Hot water Boilers (2) (digester gas, natural gas)	Cleaver Brooks	CB-125	8.4 MM Btu/hr
S-29	Internal Combustion lean burn	Waukesha	L7042G0	750 h.p. before 6/15/97
S-30	engine #1 (digester gas, natural gas)  Internal Combustion lean burn engine #2 (digester gas, natural gas)	Waukesha	L7042G0	1160 h.p. after 6/15/97 750 h.p. before 6/15/97 1160 h.p. after 6/15/97
S-31	Internal Combustion lean burn engine #3 (digester gas, natural gas)	Waukesha	L7042G0	750 h.p. before 6/15/97 1160 h.p. after 6/15/97
S-100	Municipal Wastewater Treatment Plant	Custom		20 MM gal/day
S-110	Preliminary Treatment	Custom		20 MM gal/day
S-120	Primary Treatment	Custom		20 MM gal/day
S-130	Flow Equalization	Custom		20 MM gal/day
S-140	Secondary Treatment	Custom		20 MM gal/day
S-150	Secondary Clarifiers	Custom		20 MM gal/day
S-160	Tertiary Treatment	Custom		20 MM gal/day
S-170	Disinfection	Custom		20 MM gal/day
S-180	Sludge Handling Processes	Custom		20 MM gal/day
S-190	Anaerobic Digestors	Custom		M gal/day

# **B.** Abatement Device List

**Table II-B** 

<b>A-</b> #	Description	Source(s) Controlled	Applicable Requirement	Operating Parameters	Required Efficiency
A-1	Biofilter 50,000 sq. ft	S-3,4,5	7-300		90%

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# III. GENERAL APPLICABLE REQUIREMENTS

The permit holder shall comply with all applicable requirements, including those specified in the BAAQMD and SIP Rules and Regulations and other federal requirements cited below. These requirements apply in a general manner to the facility and/or to sources exempt from the requirement to obtain a District Permit to Operate. The District has determined that these requirements would not be violated under normal, routine operations, and that no additional periodic monitoring or reporting to demonstrate compliance is warranted. In cases where a requirement, in addition to being generally applicable, is also specifically applicable to one or more sources, the requirement and the source are also included in Section IV, Source-Specific Applicable Requirements, of this permit.

The dates in parenthesis in the Title column identify the versions of the regulations being cited and are, as applicable:

- 1. BAAQMD regulation(s):
  - The date(s) of adoption or most recent amendment of the regulation by the District Board
- 2. Any federal requirement, including a version of a District regulation that has been approved into the SIP:

The most recent date of EPA approval of any portion of the rule, encompassing all actions on the rule through that date

Where an applicable requirement is a SIP requirement, the full language of the SIP requirement is included in Appendix A of this permit.

Applicable Requirement	Regulation Title or Description of Requirement	FE (Y/N)
BAAQMD Regulation 1	General Provisions and Definitions (11/3/93)	N
SIP Regulation 1	General Provisions and Definitions (11/10/82)	Y
BAAQMD Regulation 4	Air Pollution Episode Plan (3/20/91)	N
SIP Regulation 4	Air Pollution Episode Plan (8/06/90)	Y
BAAQMD Regulation 5	Open Burning (11/2/94)	N
SIP Regulation 5	Open Burning (5/3/84)	Y
BAAQMD Regulation 6	Particulate Matter and Visible Emissions (12/19/90)	N
SIP Regulation 6	Particulate Matter and Visible Emissions (5/3/84)	Y
BAAQMD Regulation 7	Odorous Substances (3/17/82)	N
BAAQMD Regulation 8, Rule 1	Organic Compounds - General Provisions (6/15/94)	Y
BAAQMD Regulation 8, Rule 3	Organic Compounds - Architectural Coatings (12/20/95)	

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# III. General Applicable Requirements (continued)

Applicable Regulation Title or Description of Requirement		FE (Y/N)
SIP Regulation 8, Rule 3	Organic Compounds - Architectural Coatings (11/16/83)	Y
BAAQMD Regulation 8, Rule 4	Organic Compounds-General Solvent and Surface Coating Operations (12/20/95)	Y
BAAQMD Regulation 8, Rule 16	Organic Compounds-Solvent Cleaning Operation (12/20/95)	Y
BAAQMD Regulation 8, Rule 49	Organic Compounds - Aerosol Paint Products (12/20/95)	
SIP Regulation 8, Rule 49	Organic Compounds - Aerosol Paint Products (3/22/95)	Y
BAAQMD Regulation 8, Rule 51	Organic Compounds - Adhesive and Sealant Products (12/20/95)	N
BAAQMD Regulation 9, Rule 1	Inorganic Gaseous Pollutants-Sulfur Dioxide (3/15/95)	N
SIP Regulation 9, Rule 1	Inorganic Gaseous Pollutants - Sulfur Dioxide (5/3/84)	Y
BAAQMD Regulation 9, Rule 2	Inorganic Gaseous Pollutants-Hydrogen Sulfide (3/17/82)	N
BAAQMD Regulation 11, Rule 2	Hazardous Pollutants - Asbestos Demolition, Renovation and Manufacturing (12/4/91)	Y
BAAQMD Regulation 12, Rule 4	Miscellaneous Standards of Performance - Sandblasting (7/11/90)	
SIP Regulation 12, Rule 4	Miscellaneous Standards of Performance - Sandblasting (9/2/81)	Y

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# IV. SOURCE-SPECIFIC APPLICABLE REQUIREMENTS

The permit holder shall comply with all applicable requirements, including those specified in the BAAQMD and SIP Rules and Regulations and other federal requirements cited below. The requirements cited in the following tables apply in a specific manner to the indicated source(s).

The dates in parenthesis in the Title column identify the versions of the regulations being cited and are, as applicable:

- 1. BAAQMD regulation(s):

  The date(s) of adoption or most recent amendment of the regulation by the District Board
- Any federal requirement, including a version of a District regulation that has been approved into the SIP:

The most recent date of EPA approval of any portion of the rule, encompassing all actions on the rule through that date

The full text of each permit condition cited is included in Section VI, Permit Conditions, of this permit. Additionally, where an applicable requirement is a SIP requirement, the full language of the SIP requirement is included in Appendix A of this permit. All other text may be found in the regulations themselves.

Table IV-A S-3 Compost bay, S-4 Stockpiles, S-5 Screens

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD	Particulate Matter and Visible Emissions (12/19/90)		
Regulation 6			
6-301	Ringelmann Number 1 Limitation	N	
6-401	Appearance of Emissions	Y	
SIP	PROVISIONS NO LONGER IN CURRENT RULE		
Regulation 6	Particulate Matter and Visible Emissions (6/16/83)		
6-301	Ringelmann Number 1 Limitation (9/5/79)	$\mathbf{Y}^{1}$	

This section of the SIP rule has been removed from or revised in the current BAAQMD rule. Nevertheless, the source must comply with this SIP requirement until US EPA has reviewed and approved the District's revision of the regulation.

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# **IV.** Source-Specific Applicable Requirements (continued)

**Table IV-A** (continued) S-3 Compost bay, S-4 Stockpiles, S-5 Screens

Applicable Requirement	Regulation Title or  Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD	Odorous Substances (3/17/82)	N	
Regulation 7			
7-303	Limit on Odorous Compounds	N	
BAAQMD Condition #12848			
Part 1	Ringelmann limit (basis: BACT, 1-301)	Y	
Part 3	Throughput limit (basis: cumulative increase)	Y	
Part 4	Minimize Particulate Emissions (basis: 6-301)	Y	
Part 6	Odor Limitation (basis: 7-301)	N	
Part 7	Daily Record Keeping of usage (basis: cumulative increase)	Y	

Table IV-B S-17, S-18 Irrigation Ponds, S-110 Preliminary Treatment, S-120 Primary Treatment, S-140 Secondary Treatment, S-150 Secondary Clarifiers, S-160 Tertiary Treatment, S-170 Disinfection, S-180 Sludge Handling, S-190 Anaerobic Digestors

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD Regulation 8, Rule 2	Organic Compounds-Miscellaneous Operation (6/15/94)	Y	
8-2-301	Miscellaneous Operations	Y	

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# IV. Source-Specific Applicable Requirements (continued)

Table IV-C S-28 Two Hot Water Boilers burning natural and digester gas

Applicable	Regulation Title or	Federally Enforceable	Future Effective
Requirement	Description of Requirement	(Y/N)	Date
BAAQMD	Inorganic Gaseous Pollutants-NOx and CO from Industrial,	N	
Regulation 9	and Commercial Boilers, Steam Generators, and Process		
Rule 7	Heaters(9/15/93)		
9-7-111	Limited Exemption, Low Fuel Usage	N	
9-7-304	Low Fuel Usage Requirements	N	
9-7-304.1	Oxygen concentration limit	N	
9-7-304.2	Tuning requirement	N	
9-7-304.3	Emission limits	N	
BAAQMD	Odor Abatement (basis: Reg. 7-102)	N	
Condition			
#1541			

Table IV-D S-29, S-30, S-31 Internal Combustion Engines at 750 h.p.

Applicable Requirement	Regulation Title or Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD	NOx and CO requirements for Stationary Internal Combustion	N	
Regulation 9	Engines (1/20/93)		
Rule 8			
9-8-301	Emission Limits - Fossil Derived Fuel Gas	N	
9-8-301.2	NOx Emission Limit for Lean Burn Engines	N	
9-8-301.3	CO Emission Limit for Lean Burn Engines	N	
9-8-302	Emission Limits - Waste Derived Fuel Gas	N	
9-8-302.1	NOx Emission Limit for Lean Burn Engines	N	
9-8-302.3	CO Emission Limit for Lean Burn Engines	N	

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# IV. Source-Specific Applicable Requirements (continued)

**Table IV-D** (continued) S-29, S-30, S-31 Internal Combustion Engines at 750 h.p.

Applicable Requirement	Regulation Title or  Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD	Operating Limit (basis: cumulative increase)	Y	
Condition	(Permit Condition effective until 6/15/97)		
#2612			
BAAQMD	(Permit Condition effective after 6/15/97)		6/15/97
Condition			
#11031			
Part 1	NOx Limit (basis: Regulation 9-8-302.1, cumulative increase)	Y	6/15/97
Part 2	Startup Test. (basis: Regulation 9-8-501)	N	6/15/97
Part 3	Periodic Monitoring for NOx (basis: Regulation 2-6-409.2)	Y	6/15/97
Part 4	Periodic Monitoring for CO (basis: Regulation 2-6-409.2)	N	
Part 4	Records (basis: cumulative increase, BAAQMD Regulation 2-6-501)	Y	6/15/97

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# **IV.** Source-Specific Applicable Requirements (continued)

Table IV-E
S-100 Wastewater Treatment Plant
S-110 Preliminary Treatment
S-120 Primary Treatment
S-140 Secondary Treatment
S-150 Secondary Clarifiers
S-160 Tertiary Treatment
S-170 Disinfection
S-180 Sludge Handling Processes
S-190 Anaerobic Digesters

		Federally	Future
Applicable	Regulation Title or	Enforceable	Effective
Requirement	Description of Requirement	(Y/N)	Date
BAAQMD	Organic Compounds-Miscellaneous Operation (6/15/94)	Y	
Regulation			
8, Rule 2			
8-2-301	Miscellaneous Operations	Y	
BAAQMD	Odor Abatement (basis: Reg. 7-1-102)	N	
Condition			
#947			

Table IV-F S-130 Flow Equalization

Applicable Requirement	Regulation Title or  Description of Requirement	Federally Enforceable (Y/N)	Future Effective Date
BAAQMD Regulation	Organic Compounds-Miscellaneous Operation (6/15/94)	Y	
8, Rule 2			
8-2-301	Miscellaneous Operations	Y	
BAAQMD Condition #784	Odor Abatement (basis: Reg. 7-1-102)	N	

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# V. SCHEDULE OF COMPLIANCE

The permit holder shall continue to comply with all applicable requirements cited in Parts III and IV of this permit. The permit holder shall also comply with applicable requirements that become effective during the term of this permit.

### VI. PERMIT CONDITIONS

Any condition that is preceded by an asterisk is not federally enforceable.

# A. Source Specific Permit Conditions

### \*Condition #784

For S-130 Flow Equalization

1. If the District receives more than five confirmed complaints in a week, the City of Santa Rosa WWTP shall take immediate action to abate the odor (Basis: BAAQMD Reg. 7-102).

### \*Condition #947

For S-100 Wastewater Treatment Plant

1. If the District receives more than five confirmed complaints in a week, the City of Santa Rosa WWTP shall take immediate action to abate the odor (Basis: BAAQMD Reg. 7-102).

#### \*Condition #1541

For S-28 Hot Water Boilers

1. If the District receives more than five confirmed complaints in a week, the City of Santa Rosa WWTP shall take immediate action to abate the odor (Basis: BAAQMD Reg. 7-102).

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# VI. Permit Conditions (continued)

# **A.** Source-Specific Permit Conditions (continued)

### Condition #2612

For S-29, 30, 31 Internal Combustion Engines Condition effective until 6/15/97

1. Only one of the three engines shall be operated at any given time (Basis: Cumulative Increase).

### **Condition #11031**

For Sources S-29, S-30 and S-31 Condition effective after 6/15/97

- 1. Emissions of NOx from this source shall not exceed 140 ppmv as corrected to 15% oxygen, dry basis. (basis: Regulation 9-8-302.1, cumulative increase)
- 2. Within 30 days after start-up, The City of Santa Rosa shall conduct a performance test in accordance with the District test procedures to demonstrate compliance with condition number 1. Written notice of the test shall be provided to the District 10 days prior to the test so that an observer from the District be present. (basis: Regulation 9-8-501)
- 3. City of Santa Rosa shall ensure that an annual performance test is conducted in accordance with the District test procedures to demonstrate compliance with the NOx limits. City of Santa Rosa may submit an alternative monitoring plan to the District for approval. If the alternative monitoring plan is approved, the plan shall supercede the annual source test requirement. Approvals shall be processed using the permit modification procedure contained in Regulation 2, Rule 6. (Basis: Regulation 2-6-409.2)
- 4. Effective upon effective date of approval of Regulation 9, Rule 8 into the California State Implementation Plan by EPA:
  City of Santa Rosa shall ensure that an annual performance test is conducted in accordance with the District test procedures to demonstrate compliance with the CO limits. City of Santa Rosa may submit an alternative monitoring plan to the District for approval. If the alternative monitoring plan is approved, the plan shall supercede the annual source test requirement. Approvals shall be processed using the permit modification procedure contained in Regulation 2, Rule 6. (Basis: Regulation 2-6-409.2)

### **Condition #11031**

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# **VI. Permit Conditions (continued)**

# **A.** Source-Specific Permit Conditions (continued)

For Sources S-29, S-30 and S-31 Condition effective after 6/15/97

5. A District approved engine log shall be maintained to record the hours of operation, amount of digester gas and natural gas combusted to produce the power. This log shall be maintained for a period of at least five years and shall be made available to District personnel upon request. (basis: cumulative increase, BAAQMD Regulation 2-6-501)

### **Condition #12848**

For S-3 Composting Bay, S-4 Stockpiles, S-5 Screens, A-1 Biofilter

- 1. Visible particulate emissions from this source shall not exceed Ringelmann 0.5 or result in fallout on adjacent property in such quantities to cause a public nuisance per Regulation 1-301. (Basis: BACT, Regulation 1-301)
- \*2. The facility shall conduct a District approved source test on A-1 Biofilter within 60 days of start-up to ensure that this facility is in compliance with Regulation 7, Section 303 for the following compounds: (Basis: Regulation 7)
  - a Dimethylsulfide (CH3)2S
  - b. Mercaptans, calculated as methylmercaptan CH3SH
  - c. Ammonia NH3

The samples shall be collected as prescribed in the Manual of Procedures, Volume IV and submitted to the District.

- 3. Throughput of sludge and yard waste mixture shall not exceed 36,500 tons in any consecutive 12 month period. (Basis: cumulative increase)
- 4. For the compost that is stockpiled, both in the curing pile and storage piles, water shall be added manually as needed to reduce particulates. (Basis: Regulation 6-301)

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# VI. Permit Conditions (continued)

# A. Source-Specific Permit Conditions (continued)

### **Condition #12848**

For S-3 Composting Bay, S-4 Stockpiles, S-5 Screens, A-1 Biofilter

- \*5. The stockpile of shredded screen yard waste (i.e., green tree trimmings, green leaves, brushes) shall be processed no later than 5 days from the time they are received to prevent wood decomposition and odors. (Basis: Reg. 7)
- \*6. If the facility receives 2 or more Violation Notices from the District for "Public Nuisance" in any consecutive 12 month period, the owner/operator of this facility shall submit to the District within 30 days, an application to modify the Permit to Operate to include the following control measures as applicable or any other that the District deems necessary and appropriate. (Basis: Reg. 7)
  - a. Reduce holding time of yard waste from 5 days to 3 days.
  - b. Replace biofilter media with new material if it no longer is effective and decomposition has set it, or increase the biofilters thickness so that no odors are detected.
- 7. In order to demonstrate compliance with the above conditions, the operator of sources S-3, S-4 and S-5 shall maintain the following records in a District approved log. These records shall be kept on facility and made available for District inspection for a period of five years from the date that the record was made. (Basis: Cumulative Increase, BAAQMD Regulation 2-6-501)
  - a. Daily throughput of sludge/yard waste material being processed, summarized on a monthly basis.
  - b. Cubic yards of stockpiled yard waste received in stockpiled area and removed for processing during a 5 day time period.
  - c. Daily hours of operation, summarized on a monthly basis.

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# VII. APPLICABLE EMISSION LIMITS & COMPLIANCE MONITORING REQUIREMENTS

This section has been included only to summarize the applicable emission limits contained in Section IV, Source-Specific Applicable Requirements, of this permit. The following tables show the relationship between each emission limit and the associated compliance monitoring provisions, if any. The monitoring frequency indicates whether periodic (P) or continuous (C) monitoring is required. For periodic monitoring, the frequency of the monitoring has also been shown, either annual (A), quarterly (Q), monthly (M), daily (D), or on an event basis (E). No monitoring (N) has been required if the current applicable rule or regulation does not require monitoring, and the operation is unlikely to deviate from the applicable emission limit based upon the nature of the operation.

Table VII-A S-3 Compost bay, S-4 Stockpiles, S-5 Screens

Pollutant	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
TSP	6-301	N		Ringelmann No. 1		N	N
	BAAQMD	Y		Ringelmann No. 1		N	
	Cond #12848,						
	Part 1						
	BAAQMD	Y		0.15 grain/dscf		N	
	6-310			@ 6% O2			
	SIP 6-301	Y		Ringelmann No. 1		N	

# Table VII-B S-17, S-18 Irrigation Ponds,

S-100 Wastewater Treatment Plant, S-110 Preliminary Treatment, S-120 Primary Treatment, S-130 Flow Equalization, S-140 Secondary Treatment, S-150 Secondary Clarifiers, S-160 Tertiary Treatment, S-170 Disinfection, S-180 Sludge Handling, S-190 Anaerobic Digestors

			Future		Monitoring	Monitoring	
	Emission	FE	Effective		Requirement	Frequency	Monitorin
Pollutant	Limit	Y/N	Date	<b>Emission Limit</b>	Citation	(P/C/N)	g Type
	Citation						

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# VII. Applicable Emission Limits & Compliance Monitoring Requirements (continued)

VOC	BAAQMD	Y	15 lb/day & 300 ppm	N	N	N
	8-2-301		total carbon on dry			
			basis			

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# VII. Applicable Emission Limits & Compliance Monitoring Requirements (continued)

Table VII-C S-29, S-30, S-31 I.C. Engines

Pollutant	Emission Limit Citation	FE Y/N	Future Effective Date	Emission Limit	Monitoring Requirement Citation	Monitoring Frequency (P/C/N)	Monitoring Type
NOx	BAAQMD	N		NOx<140 ppmv	condition	P/A <sup>2</sup>	source test or
	9-8-301.2			corrected to 15%	#11031,		alternate
				oxygen, dry basis	part 3 <sup>2</sup>		monitoring
							plan <sup>2</sup>
NOx	BAAQMD	N		NOx<140 ppmv	condition	P/A <sup>2</sup>	source test or
	9-8-302.1			corrected to 15%	#11031,		alternate
				oxygen, dry basis	part 3 <sup>2</sup>		monitoring
							plan <sup>2</sup>
	Condition	Y		NOx<140 ppmv	condition	P/A	source test or
	11031, part 1			corrected to 15%	#11031,		alternate
				oxygen, dry basis	part 3		monitoring
							plan
CO	BAAQMD	N		CO<2000 ppmv	condition	P/A <sup>2</sup>	source test or
	9-8-301.3			corrected to 15%	#11031,		alternate
				oxygen, dry basis	part 4 <sup>2</sup>		monitoring
							plan <sup>2</sup>
CO	BAAQMD	N		CO<2000 ppmv	Condition	P/A <sup>2</sup>	source test or
	9-8-302.3			corrected to 15%	#11031,		alternate
				oxygen, dry basis	part 4 <sup>2</sup>		monitoring
							plan <sup>2</sup>

<sup>&</sup>lt;sup>2</sup> This condition will become effective after Regulation 9, Rule 8 is approved into the California SIP.

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# VII. Applicable Emission Limits & Compliance Monitoring Requirements (continued)

Table VII-D
S-100 Wastewater Treatment Plant
S-110 Preliminary Treatment
S-120 Primary Treatment
S-130 Flow Equalization
S-140 Secondary Treatment
S-150 Secondary Clarifiers
S-160 Tertiary Treatment
S-170 Disinfection
S-180 Sludge Handling Processes
S-190 Anaerobic Digesters

	Emission	- FE	Future		Monitoring	Monitoring	3.6
D-11-44	Limit	FE	Effective	Factories I tools	Requirement	Frequency	Monitoring
Pollutant	Citation	Y/N	Date	Emission Limit	Citation	(P/C/N)	Type
VOC	BAAQMD	Y		Emissions may not		N	
	8-2-301			exceed 300 ppm total			
				carbon, dry, and 15			
				lb/day/source			

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# VIII. TEST METHODS

The test methods associated with the emission limit of a District regulation are generally found in Section 600 of the regulation. The following table indicates only the test methods associated with the emission limits referenced in Section VII - Applicable Emission Limits & Compliance Monitoring Requirements, of this permit.

Applicable		
Requirement	<b>Description of Requirement</b>	Acceptable Test Methods
BAAQMD	Ringelmann No. 1 Limitation	Manual of Procedures, Volume I, Evaluation of Visible
6-301		Emissions
SIP	Ringelmann No. 1 Limitation	Manual of Procedures, Volume I, Evaluation of Visible
6-301		Emissions
BAAQMD	Particulate Weight Limitation	Manual of Procedures, Volume IV, ST-15, Particulates
6-310		Sampling
BAAQMD	Limit on Odorous Compounds	Manual of Procedures, Volume IV, ST-1, ST-8,
7-303		ST-11, ST-16, ST-22, Sampling of Odorous Compounds
BAAQMD	Miscellaneous Operations	Manual of Procedures, Volume IV, ST-7, Non-Methane
8-2-301		Organic Carbon Sampling or
		EPA Method 25 or 25A.
BAAQMD	General Emission Limitation	Manual of Procedures, Volume IV, ST-19A, Sulfur
9-1-302		Dioxide, Continuous Sampling, or
		ST-19B, Total Sulfur Oxides Integrated Sample
BAAQMD	Fossil Derived Fuel Gas, NOx	Manual of Procedures, Volume IV, ST-13A, Oxides of
9-8-301.2	Limits for Lean Burn Engines	Nitrogen, Continuous Sampling Limit on Odorous
		Compounds and
		ST-14, Oxygen, Continuous Sampling
BAAQMD	Fossil Derived Fuel Gas, CO	Manual of Procedures, Volume IV, ST-6, Carbon
9-8-301.3	Limits	Monoxide, Continuous Sampling and
		ST-14, Oxygen, Continuous Sampling
BAAQMD	Waste Derived Fuel Gas NOx	Manual of Procedures, Volume IV, ST-13A, Oxides of
9-8-302.1	Limits for Lean Burn Engines	Nitrogen, Continuous Sampling Limit on Odorous
		Compounds and
		ST-14, Oxygen, Continuous Sampling
BAAQMD	Waste Derived Fuel Gas CO	Manual of Procedures, Volume IV, ST-6, Carbon
9-8-302.3	Limits	Monoxide, Continuous Sampling and
		ST-14, Oxygen, Continuous Sampling
BAAQMD	NOx Limit	Manual of Procedures, Volume IV, ST-13A, Oxides of
Cond #11031,		Nitrogen, Continuous Sampling Limit on Odorous
Part 1		Compounds and ST-14, Oxygen, Continuous Sampling
BAAQMD	Ringelmann limit	Manual of Procedures, Volume I, Evaluation of Visible
Cond #12848,		Emissions
Part 1		

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### IX. GLOSSARY

### **BAAQMD**

Bay Area Air Quality Management District

#### **BACT**

Best Available Control Technology

#### **Basis**

The underlying authority which allows the District to impose requirements.

### CO

Carbon Monoxide

### **Cumulative Increase**

The sum of permitted emissions from each new or modified source since a specified date pursuant to BAAQMD Rule 2-1-403, Permit Conditions (as amended by the District Board on 7/17/91) and SIP Rule 2-1-403, Permit Conditions (as approved by EPA on 6/23/95). Used to determine whether threshold-based requirements are triggered.

#### **District**

The Bay Area Air Quality Management District

### **EPA**

The federal Environmental Protection Agency.

### **Excluded**

Not subject to any District Regulations.

#### Federally Enforceable, FE

All limitations and conditions which are enforceable by the Administrator of the EPA including those requirements developed pursuant to 40 CFR Part 51, subpart I (NSR), Part 52.21 (PSD), Part 60, (NSPS), Part 61, (NESHAPs), Part 63 (HAP), and Part 72 (Permits Regulation, Acid Rain), and also including limitations and conditions contained in operating permits issued under an EPA-approved program that has been incorporated into the SIP.

### **HAP**

Hazardous Air Pollutant. Any pollutant listed pursuant to Section 112(b) of the Act. Also refers to the program mandated by Title I, Section 112, of the Act and implemented by both 40 CFR Part 63, and District Regulation 2, Rule 5.

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# **IX.** Glossary (continued)

### **Major Facility**

A facility with potential emissions of regulated air pollutants greater than or equal to 100 tons per year, greater than or equal to 10 tons per year of any single hazardous air pollutant, and/or greater than or equal to 25 tons per year of any combination of hazardous air pollutants, or such lesser quantity as determined by the EPA administrator.

#### **MFR**

Major Facility Review. The District's term for the federal operating permit program mandated by Title V of the Act and implemented by District Regulation 2, Rule 6.

### **MOP**

The District's Manual of Procedures.

#### **NMHC**

Non-methane Hydrocarbons

#### **NOx**

Oxides of nitrogen.

#### **NSR**

New Source Review. A federal program for preconstruction review and permitting of new and modified sources of air pollutants for which the District is classified "non-attainment". Mandated by Title I of the Clean Air Act and implemented by 40 CFR Parts 51 and 52 as well as District Regulation 2, Rule 2. (Note: There are additional NSR requirements mandated by the California Clean Air Act.)

### **Offset Requirement**

A New Source Review requirement to provide federally enforceable emission offsets at a specified ratio for the emissions from a new or modified source and any pre-existing cumulative increase minus any on site contemporaneous emission reduction credits. Applies to emissions of POC, NOx, PM10, and SO2.

#### **POC**

Precursor Organic Compounds

#### **PM**

**Total Particulate Matter** 

### **PM10**

Particulate matter with aerodynamic equivalent diameter of less than or equal to 10 microns

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#### IX. **Glossary** (continued)

### **PSD**

Prevention of Significant Deterioration. A federal program for permitting new and modified sources of air pollutants for which the District is classified "attainment" of the National Air Ambient Quality Standards. Mandated by Title I of the Act and implemented by both 40 CFR Part 52 and District Regulation 2, Rule 2.

### IP

State Implementation Plan. State and District programs and regulations approved by EPA and developed in order to attain the National Ambient Air Quality Standards. Mandated by Title I of the Act.

### SO<sub>2</sub>

Sulfur dioxide

### Title V

Title V of the federal Clean Air Act. Requires a federally enforceable operating permit program for major and certain other facilities.

### **VOC**

Volatile Organic Compounds

### **Units of Measure:**

bhp	=	brake-horsepower
Btu	=	British Thermal Unit
g	=	grams
gal	=	gallon
hp	=	horsepower
hr	=	hour
lb	=	pound
in	=	inches
max	=	maximum
$m^2$	=	square meter
min	=	minute
MM	=	million
ppmv	=	parts per million, by volume
ppmw	=	parts per million, by weight
psia	=	pounds per square inch, absolute
psig	=	pounds per square inch, gauge
scfm	=	standard cubic feet per minute
yr	=	year

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#### X. **APPENDIX A - STATE IMPLEMENTATION PLAN**

See Attachment